

CA30NH2 Q78

8/4/11

Hamilton-Wentworth, Dept. of
Economic Development.

L Hamilton Construction
Sector in 1981



THE REGIONAL MUNICIPALITY OF HAMILTON-WENTWORTH

Economic Development Department
Century 21, 100 Main Street East
P.O. Box 910, Hamilton, Ontario L8N 3V9

Industrial Development Convention and Tourism (416) 526-4222
Toronto Direct 362-1973

Refer to File No.

Attention of

Your File No.

February 5, 1981

MEMORANDUM

TO: John D. Morand
FROM: Arie Ashkenazy
RE: Metropolitan Hamilton Construction Sector in 1981

HAMILTON PUBLIC LIBRARY
MAR 14 1981
GOVERNMENT DOCUMENTS

TABLE OF CONTENTS

- 1.0 Executive Summary
- 2.0 Definition and Past Performance
- 3.0 The Residential Construction Sector
- 4.0 Alterations and Repairs
- 5.0 The Non-Residential Construction Sector
- 6.0 Contacts

Appendices A
B
C
D

THE UNIVERSITY OF CHICAGO
LIBRARY
540 EAST 57TH STREET
CHICAGO, ILL. 60637

1. Executive Summary

- 1.1 Net job creation will amount to between 450 - 650 jobs.
- 1.2 Between 650 - 800 jobs will be added in Residential construction.
- 1.3 Between 50 - 100 jobs will be added in Industrial construction.
- 1.4 Some 250 jobs will be eliminated in Commercial construction.
- 1.5 Starts will increase by 20% to 2,000 mostly in the detached and semi-detached types.
- 1.6 Industrial construction will continue to be strong.
- 1.7 Commercial construction will experience a relative decline with the completion of Limeridge Mall.
- 1.8 Institutional and Government construction is assumed to maintain its present level of activity.
- 1.9 Contemplated major project can positively affect the outlook for 1981 if started in 1981.

2. Definition and Past Performance

2.1 Definition

The construction industry contains two major groups:

- General Contractors
- Special Trade Contractors

Under General Contractors, we find Building Construction (construction of houses, farm, public, industrial, and commercial buildings as well as speculative construction, alterations and repairs). Another category is Highway, Bridge, and Street Construction. The construction of projects such as waterworks, gas mains, sewers, hydro-electric plants, transmission lines, telephone lines, power canals, docks and piers, etc. is included under the category - Other Construction. Under Special Trade Contractors, we find subcontractors engaged in bricklaying, carpentry, cement work, electrical work, lathing, plastering, stucco work, painting, decorating, plumbing, heating, roofing, sheet metal work, etc. (For the full definition of the Construction Industry, refer to Appendix A).

2.2 Past Performance

The present status of the Construction Industry is to a large extent the result of what has been happening in the last six years from 1975 up to now. The most widely used indicator of activity in the construction industry is the value of building permits. (For definition and explanation, see Appendix B).

VALUE OF BUILDING PERMITS BY CATEGORY

METROPOLITAN HAMILTON 1975 - 1980

\$ Millions

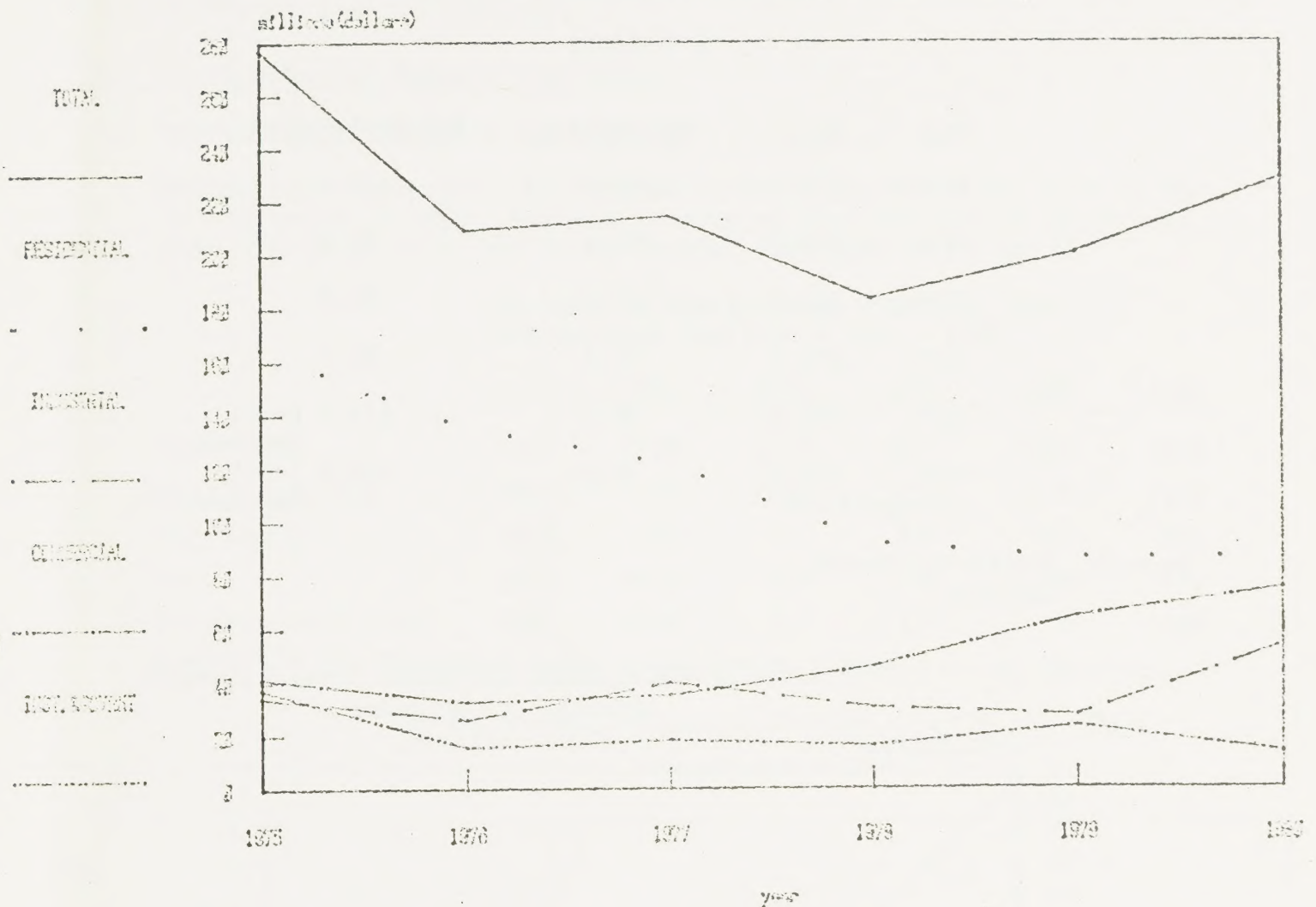
<u>Year</u>	<u>Total</u>	<u>Residential</u>	<u>Industrial</u>	<u>Commercial</u>	<u>Institutional & Government</u>
1975	277.1	164.7	34.0	41.3	37.1
1976	209.5	135.5	25.9	32.6	15.5
1977	214.6	121.8	39.7	35.0	18.1
1978	183.4	91.9	30.2	45.5	15.8
1979	200.9	86.3	27.1	64.3	23.1
1980	228.8	86.9	53.6	74.9	13.4
Extrapolation					
January to October 1980	183.1	69.5	42.9	59.9	10.7

Source: Statistics Canada

Unfortunately, engineering construction is not usually included in the building permit data. However, the value of this type of construction (bridges and overpasses, marine engineering, waterworks/sewers, roads, airfields, dams, etc.) was obtained from Canadata. (See Appendix C). The value of this construction averaged forty million dollars in 1979 and 1980.

VALUE OF BUILDING PERMITS BY CATEGORY

METROPOLITAN HUNTLEY 1975-1980



More detailed graphs are presented in Appendix D

To further illustrate the data, we have combined the building permit data into two categories: Residential and Non-Residential.

VALUE OF BUILDING PERMITS BY CATEGORY

METROPOLITAN HAMILTON 1975 - 1980

\$ Millions

<u>Year</u>	<u>Total</u>	<u>Residential</u>	<u>Non-Residential</u>
1975	277.1	164.7	112.4
1976	209.5	135.5	74.0
1977	214.6	121.8	92.8
1978	183.4	91.9	91.5
1979	200.9	86.3	114.5 (+40) Canadata
1980 Extrapolation	228.8	86.9	141.9 (+40) Canadata

Source: Statistics Canada
Canadata

VALUE OF BUILDING PERMITS BY CATEGORY

METROPOLITAN HAMILTON 1975-1982



As can be readily seen, the Residential and Non-Residential construction exhibits very different behaviour patterns. The decline in residential construction is dramatic whereas the Non-Residential construction shows an initial decline with a subsequent pickup in activity in 1978 and 1980. Even when allowing for inflation, it is evident that the two sector demands different types of analyses.

3. The Residential Construction Sector:

3.1 Residential Construction by Type

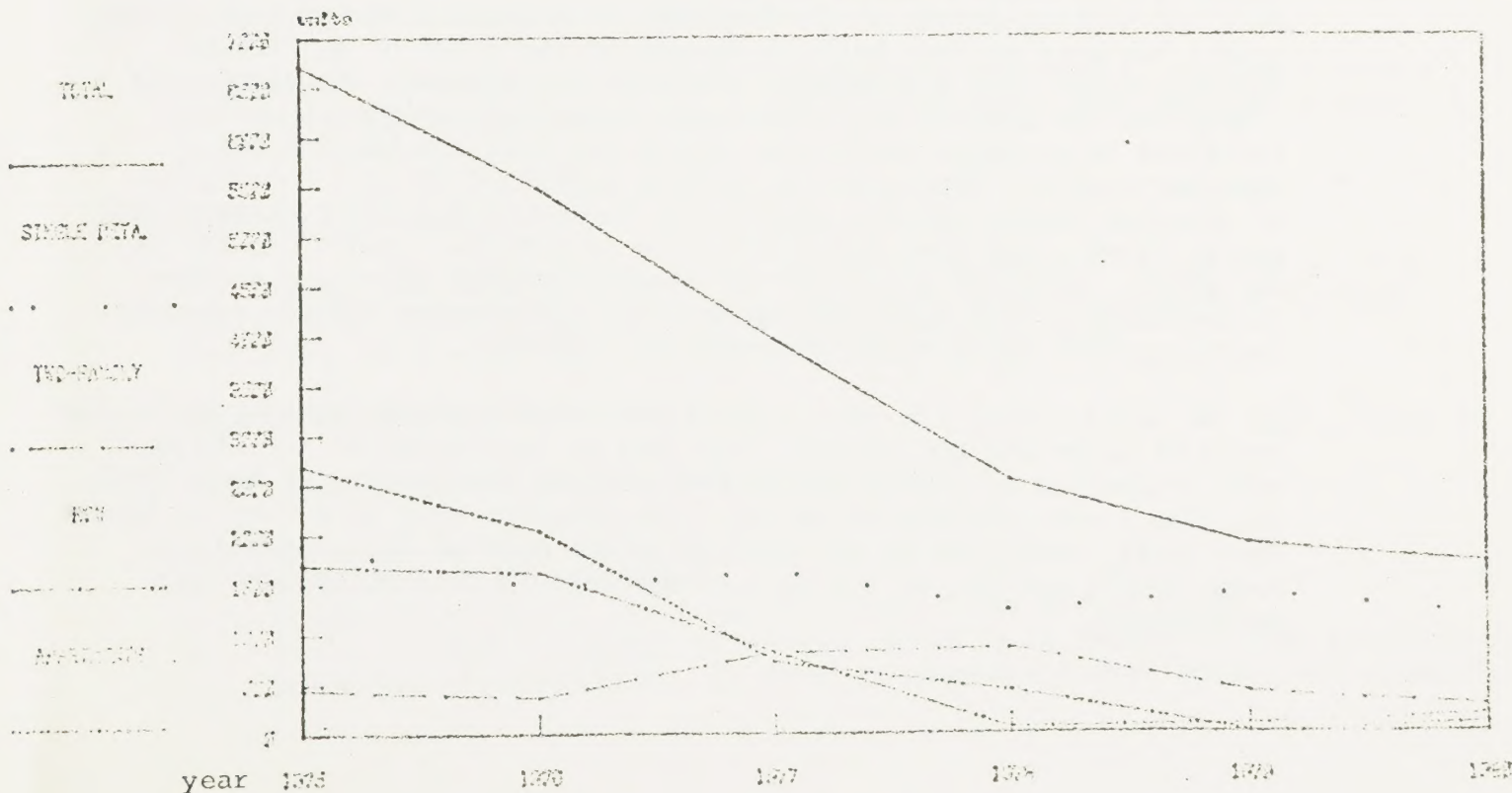
Residential construction has dropped dramatically from 6720 units in 1975 to 1700 units in 1980. The most pronounced drop has been in apartments from 2680 to 88 units and in row housing from 1685 to 171 units.

Residential Construction Starts by Type
Metropolitan Hamilton - 1975 - 1980

	1975	1976	1977	1978	1979	1980
Total	6720	5490	3955	2531	1885	1699
Single detached	1890	1471	1624	1219	1400	1175
Two family	447	367	810	846	405	265
Row	1695	1613	809	46	80	171
Apartment and other	2688	2039	713	420	0	88

Source : 1975 - 1978 Statistics Canada, 1979 - 1980 C.M.H.C. Hamilton

RESIDENTIAL CONSTRUCTION STARTS BY TYPE
METROPOLITAN HAMILTON 1975-1980



3.2 Analysis

Housing demand is for the most part influenced by the following factors :

- a. Population growth/decline
- b. Disposable income
- c. Cost of all other goods
- d. Inflation expectation
- e. And last but not least mortgage costs

Population growth, increases in real disposable incomes, relative decreases in the costs of all other goods, rising inflationary expectations, lower interest cost on mortgages all serve to increase demand for housing (ownership). The ready availability and low cost of rental accommodation (apartments) exerts a negative direct influence on condominium housing and somewhat negative indirect influence on row and low cost semi and detached housing. The mid-seventies saw the players in the marketplace greatly misjudge the demands available both in terms of quantity and quality/type. The resulting oversupply was most pronounced in condominiums and row housing, which were aimed at medium and low income segment of the population. However, as experience has taught us, both apartments and row housing proved to be quite expensive especially where compared to the direct substitute in the form of rental apartments, which under the rent controls, offer substantial savings. The net result was that owners of condominiums and row housing saw the value of their properties decline. The newly formed negative expectations on the value of apartments and row housing as a hedge against inflation further depressed demand for these types bringing forward an almost complete halt in the construction of these types. The construction of semi-detached and detached housing experienced a much more gradual and less severe decline. In fact the single detached housing market which is geared to upper medium and high income groups has more or less held its ground in the light of aggravated economic conditions everywhere. Although real incomes increased very slowly and the cost of all other goods increased rapidly as well as increases in mortgage costs, the demand for detached housing has remained stable. This could be further explained in that the buyers of detached houses usually have higher incomes and greater accumulated wealth which makes them less vulnerable to economic conditions and uncertainty. Also the appeal of the single detached house was further strengthened by its relatively good price performance and the revealed preference for these types of housing by society.

On the supply side, the last 6 years have seen a steady escalation in the costs of materials and labour. The cost of land which is for the most part determined by demand and market power of the holders of such lands has seen a real decline in values. The relative calm in prices is therefore mostly explained by the decline in the cost of lots, as well as lower profit margins on the part of developers, contractors and sub-contractors.

In our judgement, the Capital Expenditures series reflect more accurately on the size of the construction activity in the industrial sector. Both series show a relative constant level of expenditures save for 1980. We have every reason to assume that construction activity will remain at the 1980 level. Dofasco hot rolling mill is going to increase employment in construction by 250 during 1981. It is assumed that this increase will, for the most part, balance out with weaknesses in industrial construction elsewhere, resulting in a net addition of 50-100 jobs.

5.2 Commercial construction

Commercial construction has seen a rapid growth in Hamilton area in recent years serving to relieve the slack in the residential sector.

Year	Value of Commercial Construction \$ Millions	
	Metropolitan Hamilton Building Permits	Canadata
1975	41.3	
1976	32.6	
1977	35.0	
1978	45.5	
1979	64.3	60.4
1980	74.3(extra- polation)	84.5

With the completion of the Limeridge Mall, some 250 jobs will be eliminated.

5.3 Institutional & Government Construction

This sector is subject to funding decisions by Government. We don't expect any significant deviation in its building activities from the low of 13.4 million in 1980.

5.4 Engineering Construction

Our source for this construction activity is Canadata. According to this source total engineering construction averaged 40 million dollars in 1979 and 1980. We assume the same level of activity for 1981.

5.5 Major Contemplated Projects

Four major projects are now under consideration :

- a. Arena (35 million dollars)
- b. Hotel (20 million dollars)
- c. Office Tower (might start construction at the end of 1981)
- d. Senior Citizen's Complex (9 million dollars) in Ancaster. Two apartment buildings, 40 townhouses, 11 acres of commercial development and a church.

If and when these projects are started, they can greatly affect our forecast of the construction sector activity in 1981.

6. Contacts:

a.	General Contractors Association	Tel: 525-7900
b.	HUDAC	" 527-2412
c.	Dofasco (Expansion)	" 544-3761/2853
d.	Eastern (Limeridge Mall)	" 387-1970
e.	C.M.H.C.	" 523-2451
f.	Statistics Canada - regional advisor	" 966-6586
g.	Southam Communication Limited (Canada)	" 445-6641
h.	Yale Properties	" (514)845-2265

7. Appendices:

A
B
C
D

The interesting result of this analysis is that since in apartment buildings the relative share of land in the total cost is smaller, they are relatively more expensive to build now. As for rental accommodations, the rent controls have virtually stopped all low and medium cost rental construction.

3.3 Forecast

Metropolitan Hamilton's economy is forecasted to do relatively well during 1981. We can expect some gains in real incomes, more jobs and more people living in the area. Interest rates are forecasted to decline in the second part of 1981, whereas inflationary expectations will be curbed to some extent but not eliminated altogether. On the negative side the cost of all other goods will continue to go up and limit the amounts available for housing expenditures. On balance demand is expected to pick up. Estimates by C.H.M.C. are that demand will pick up by 20%. If rent controls are relaxed we could see even greater expansion in demand and residential construction. However, if demand jumps by too much the contracted construction industry plus some market power on the part of developers could lead to sharp increases in prices. Estimated starts for 1981 are 2000 units most of which will be detached and semi-detached units. It is estimated that out of the 13000 people employed in the construction industry between 25-30% are employed in new residential construction. An increase of 20% in starts will translate into 650-800 new jobs.

4. Alterations and Repairs:

This sub-segment of the construction industry has been growing (in Ontario) in recent years. We assume that activity will remain the same, or grow slightly but in the absence of data no numerical estimate can be performed.

5. The Non-Residential Construction Sector:

The non-residential construction sector is comprised of Industrial, Commercial, Institutional and Government and Engineering construction.

5.1 Industrial Construction

We have at our disposal three sources of data on Industrial construction. The first is the value of building permits previously mentioned in this report, the second is the total capital expenditures for new construction and repairs in the manufacturing industries, and the third is the Canadata construction awards/starts monthly report.

Value of Industrial Construction \$ Millions
Metropolitan Hamilton - 1975 - 1980

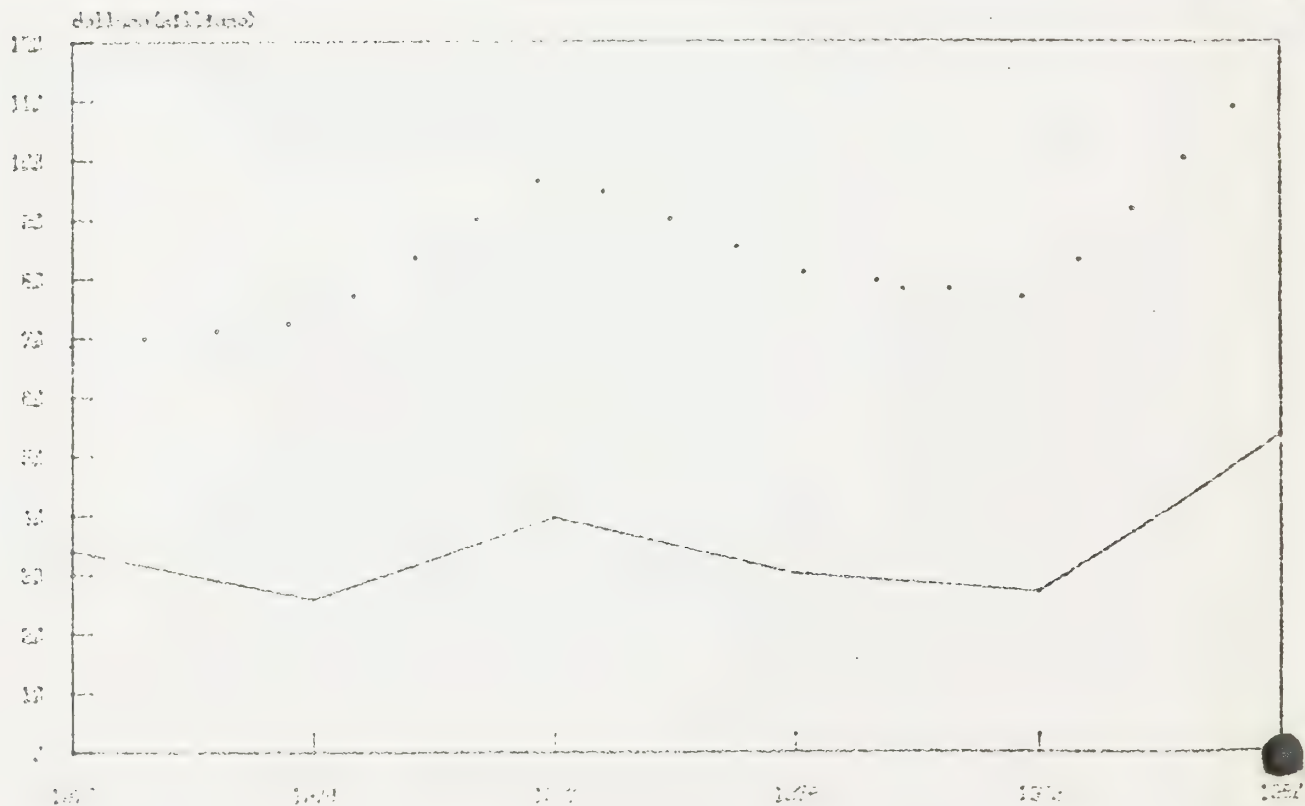
Year	Building Permits(1)	Capital Expenditures(2)	Canada
1975	34.0	68.7	
1976	25.9	72.9	
1977	39.7	98.1	
1978	30.2	81.2	
1979	27.1	76.5	40.7
1980	53.6(extrapolation)	116.9(outlook)	51.3

Sources : (1) Building Permits, Statistics Canada

(2) Private and Public Investment in Canada, Statistics Canada.

VALUE OF INDUSTRIAL CONSTRUCTION

PERMITTING PERIOD 1975-1980



DIVISION 5--MANUFACTURING INDUSTRIES -- Concluded

resins are classified in Industry No. 373--Manufacturers of Plastics and Synthetic Resins; establishments primarily engaged in manufacturing mixed fertilizers are classified in Industry No. 372--Manufacturers of Mixed Fertilizers.

- 379 **Miscellaneous Chemical Industries.**--Establishments primarily engaged in manufacturing chemical products not elsewhere classified such as explosives, ammunition, insecticides, germicides, inks, matches, adhesives, polishes and dressings. This industry includes establishments primarily engaged in coal tar distillation or wood distillation. Included also are establishments primarily engaged in manufacturing deodorants and disinfectants for household, institutional or industrial use; sweeping compounds and dry cleaning preparations.

Major Group 20--Miscellaneous Manufacturing Industries

- 391 **Scientific and Professional Equipment Industries.**--Establishments primarily engaged in manufacturing professional and scientific instruments, including surveyors', nautical, navigational, except electronic, and aeronautical instruments; barometers; thermometers; drafting instruments; lenses; photographic equipment and supplies; instruments for laboratory work and scientific research; surgical, dental and medical instruments; mechanical measuring instruments; and surgical and orthopaedic appliances and supplies, such as artificial limbs, arch supports, and artificial teeth and include establishments of dental mechanics (dental laboratories) making dentures, bridges, inlays and other dental restorations on specifications from dentists. This industry includes establishments manufacturing clocks, watches, chronometers and other timing instruments as well as establishments primarily engaged in assembling clocks and watches or in manufacturing watch materials and parts. Establishments primarily engaged in wholesale or retail dealing in watches, clocks, ophthalmic or orthopaedic appliances which do some assembling or lens grinding are included in Division 8--Trade. Establishments primarily engaged in manufacturing electronic computers, data processors and related control devices are included in Industry No. 318--Office and Store Machinery Manufacturers.

- 392 **Jewellery and Silverware Industry.**--Establishments primarily engaged in manufacturing articles of precious metals with or without precious stones, including articles plated with precious metals. This industry includes establishments primarily engaged in rolling precious metals or

making precious metal alloys as well as those primarily engaged in lapidary work and cutting and polishing diamonds. Establishments primarily engaged in manufacturing costume jewellery are included.

- 393 **Sporting Goods and Toy Industries.**--Establishments primarily engaged in manufacturing sporting and athletic goods, such as bicycles; fishing tackle; golf and tennis equipment; baseball, football and boxing equipment; skates and equipment for other sports. This industry includes establishments primarily engaged in manufacturing toys of all kinds such as tricycles, dolls, wagons, sleighs, and games.

- 397 **Signs and Displays Industry.**--Establishments primarily engaged in manufacturing signs and displays including electric signs and neon signs. Establishments primarily engaged in manufacturing displays of the statuary type such as mannequins or representations of parts of the body are also included. Establishments primarily engaged in sign painting and lettering are included in Industry No. 862--Advertising Services.

- 399 **Miscellaneous Manufacturing Industries, n.e.s.** -- Establishments primarily engaged in recording and duplicating, or in duplicating only, such articles as records, tapes, wires and other media for recording vocal or instrumental performances; in dressing and dyeing furs; and in manufacturing pianos, organs, stringed instruments, wind instruments and percussion instruments; fountain pens and parts, ball point pens, lead and mechanical pencils, crayons; carbon paper, stencil paper, inked ribbons and other typewriter supplies; jewellery cases and instrument cases; art goods, statuary, except wood, stone or concrete; feathers, plumes and artificial flowers; hair, bristles and hair goods; brooms, brushes and mops; umbrellas and canes; tobacco pipes and cigarette holders; floor tile or sheet flooring of vinyl or other synthetic resins, vinyl-asbestos, or linoleum; leatherette, oilcloth and other coated fabrics including water repellent fabrics except rubberized; buttons; beauty shop and barber shop equipment; venetian blinds; models and patterns of all materials, except extrusion moulds; rubber and metal stamps and stencils; candles; artificial ice; and many other small articles and novelties not included in other classes. Establishments primarily engaged in manufacturing radios, television sets and record, tape or similar players, are classified in Industry No. 334--Manufacturers of Household Radio and Television Receivers. Extrusion moulds are classified in Industry No. 306--Hardware, Tool and Cutlery Manufacturers.

DIVISION 6--CONSTRUCTION INDUSTRY

Major Group 1--General Contractors

This group includes general contractors primarily engaged in the construction of buildings, highways, or heavy construction such as marine installations, dams, and hydro-electric plants. Establishments that do some construction work but are primarily engaged in another activity such as utility operation, manufacturing, or mining, are classified according to their principal activity.

- 404 **Building Construction.**--General contractors primarily engaged in the construction of buildings including houses, farm buildings, public buildings, industrial and commercial buildings; or in building alterations and repairs. Establishments primarily engaged in speculative building are included in this industry.

- 405 **Highway, Bridge and Street Construction.**--General contractors primarily engaged in the construction and repair of highways, grade separations, streets, bridges, viaducts, and airports. Establishments primarily engaged in highway or street maintenance, e.g. tarring, sprinkling, filling potholes, snow removal, are included in Industry No. 516--Highway and Bridge Maintenance.

- 409 **Other Construction.**--General contractors primarily engaged in the construction of such projects as water-

works, gas mains, sewers, hydro-electric plants, transmission lines, telephone lines, power canals, dams, dikes, harbours and canals (including dredging), docks and piers, other marine construction, radio towers, railway right of way and structures and other construction projects, not elsewhere classified.

Major Group 2--Special-Trade Contractors

- 421 **Special-Trade Contractors.**--Special-trade contractors primarily engaged in construction work. Special-trade contractors perform only part of the work covered by a contract taken by a general contractor. In all instances a subcontractor working on part of a project is classified in this industry as is jobbing trade work performed directly for owners. Special-trade contractors are often engaged in repair and maintenance work, done at site, on buildings of all types. However, maintenance or repair work done by maintenance staffs in the full-time employ of the establishments on whose premises the work is being done, is excluded and such maintenance employees are classified as part of the main establishment. Establishments primarily engaged in some other activity such as the fabrication of structural steel parts but which also erect the steel on the site, are classified in accordance with their principal activity. Special-trade contractors classified in this in-

DIVISION 6—CONSTRUCTION INDUSTRY—Concluded

dustry include those engaged in bricklaying, carpentry, cement work, electrical work, lathing, plastering, stucco work, painting, decorating, plumbing, heating, air conditioning installations, roofing, sheet metal work, tiling,

marble and stone work, terrazzo work, steel erection, excavating, flooring, glazing, insulation of building, weather stripping, demolition of buildings, water well drilling.

DIVISION 7—TRANSPORTATION, COMMUNICATION AND OTHER UTILITIES

Major Group 1—Transportation

- 501 **Air Transport.**—Establishments primarily engaged in the transportation of passengers, freight, express or mail by air, and in operating fixed-wing aircraft or helicopters for hire with crew. Excluded from this industry are establishments primarily engaged in providing non-transportation services related to a single industry by means of aircraft, such as: contract crop dusting (Industry No. 021—Services Incidental to Agriculture); forestry patrol, fire inspection, fire fighting (Industry No. 039—Forestry Services); fishing inspection and protection services (Industry No. 045—Fishery Services); construction of transmission and telephone lines, radio, television and other towers (Industry No. 409—Other Construction); geophysical surveys, other aerial surveys and aerial photography (Industry No. 864—Engineering and Scientific Services).
- 502 **Services Incidental to Air Transport.**—Establishments primarily engaged in operating and maintaining civil airports, flying schools and clubs, or facilities for servicing aircraft including inspection and maintenance while in service. Also included are establishments primarily engaged in aircraft leasing without crew or in the provision of live storage for aircraft. Establishments primarily engaged in overhauling or rebuilding aircraft or aircraft engines are included in Industry No. 321—Aircraft and Aircraft Parts Manufacturers; establishments primarily engaged in the repair and overhaul of electronic equipment in Industry No. 335—Communications Equipment Manufacturers and establishments primarily engaged in operating airport limousine services in Industry No. 519—Other Transportation.
- 503 **Railway Transport.**—Establishments primarily engaged in the operation of railways for the transport of freight and passengers. This includes interurban railways but excludes street railways. Transportation and express services are classified in this industry along with maintenance of way and structures and establishments primarily engaged in operating railroad terminal facilities. Excluded from this industry are establishments operated by railway companies and primarily engaged in providing telegraph service (Industry No. 545—Telegraph and Cable Systems); hotels (Industry No. 881—Hotels and Motels); water transport (Industry No. 504—Water Transport); and shops for the building and major overhauling of railway rolling stock (Industry No. 326—Railroad Rolling Stock Industry). Establishments primarily engaged in railway construction are classified in Industry No. 409—Other Construction.
- 504 **Water Transport.**—Establishments primarily engaged in the operation of vessels for the transportation of freight and passengers whether overseas or on inland and inter-coastal waterways. This industry also includes water transportation of a local nature, such as the operation of ferries across rivers or in harbours; the operation of lighters and other harbour vessels and marine towing and tugboat services.
- 505 **Services Incidental to Water Transport.**—Establishments primarily engaged in furnishing services incidental to water transport, such as the operation and maintenance of piers, docks, wharves and associated facilities for hire; stevedoring; salvaging; steamship agencies, and canals. This industry includes establishments primarily engaged in supplying pilot service. Establishments primarily engaged in operating lighthouses, or in carrying out hydrographic surveys are included in Industry No. 909—Other Federal Administration.

- 506 **Moving and Storage, Used Goods, Uncrated.**—Establishments primarily engaged in packing, transporting, and storing used household goods and any ancillary services related to this function. This includes the local and long-distance movement of used household goods and the storage incidental to this activity whether it is of a long term or in-transit nature.
- 507 **Other Truck Transport.**—Establishments primarily engaged in the provision of local and long distance trucking, transfer and related services with the exception of those establishments engaged principally in the transportation of used uncrated goods. This industry includes contract truckers even though their equipment may be highly specialized.
- 508 **Bus Transport, Interurban and Rural.**—Establishments primarily engaged in operating interurban bus and coach lines. This industry also includes establishments primarily engaged in operating a central bus terminal for several bus lines.
- 509 **Urban Transit Systems.**—Establishments primarily engaged in furnishing urban and suburban transportation whether by electric railway, trolley coach, bus, or subway. Urban transit systems may also include ferries and any other means of transport forming part of an integrated system of urban passenger transport.
- 512 **Taxicab Operations.**—Establishments primarily engaged in furnishing passenger transportation by automobiles not operated on a regular route or between fixed terminals. This industry includes establishments primarily engaged in providing services for taxicab owners. These services may include telephone and radio telephone operations as well as maintenance and repair services for the members. Establishments primarily engaged in renting cars with driver and in operating limousines to airports or stations are included in Industry No. 519—Other Transportation.
- 515 **Pipeline Transport.**—Establishments primarily engaged in operating pipelines for the transport of goods including crude oil, natural gas and gasoline. This industry is not restricted to establishments transporting petroleum products but it includes establishments primarily engaged in operating pipelines regardless of the commodity transported.
- 516 **Highway and Bridge Maintenance.**—Establishments primarily engaged in the operation and maintenance of fixed facilities for motor vehicle transportation such as highways, bridges and tunnels. Separate terminal facilities are included with the related industry such as taxicab operations, truck transport, bus transport. Establishments primarily engaged in highway and street construction and repair are classified in Industry No. 405—Highway, Bridge and Street Construction.
- 517 **Miscellaneous Services Incidental to Transport.**—Establishments primarily engaged in furnishing services incidental to transportation, such as tourist agencies, forwarding, packing, crating, inspection and weighing services. Included are establishments primarily engaged in operating parking lots and garages for live storage of automobiles. Dead storage of automobiles is included in Industry No. 527—Other Storage and Warehousing. Government travel agencies are included in Industry No. 909—Other Federal Administration or Industry No. 931—Provincial Administration.

Minor repair jobs such as painting, tiling, roofing etc., made to existing residential buildings in order to return them to their previous states are not included in the building permits series. Estimates of such repair work may be obtained from the publications *Construction in Canada* (Catalogue 64-201, Statistics Canada) and *Public Investment Outlook* (Catalogue 61-205, Statistics Canada).

The classification for non-residential buildings or structures is divided into three major groups pertaining to the use of the structures for industrial, commercial and government and institutional purposes. These major groups are further sub-divided into principal categories of each major group.

1. **Industrial** — Includes buildings used for: manufacturing and processing; transportation, communication and other utilities and agriculture, forestry, mine and mine mill buildings.
2. **Commercial** — Includes stores, warehouses, garages, office buildings, theatres, hotels, funeral parlours, beauty salons and miscellaneous commercial — signs, posters, heating and plumbing installations, etc.
3. **Institutional and Government** — Includes expenditures made by the community, public and government for buildings and structures — schools, universities, hospitals, clinics, churches, homes for the aged, blind, deaf and dumb, government office and administration buildings, law enforcement, public protection, national defence, and ancillary buildings such as dormitories, residences, church rectories, gymnasiums, heating plants, laundries and cafeterias for hospitals, schools or universities.

BASIS FOR CLASSIFICATION

The Classification of structures into major groups and sub-groups is dependent upon: the intended use of the structure in the case of new buildings; the present or intended use of the building to which alterations and improvements are being made; affiliation of the structure where the proposed structure is to provide ancillary facilities to the existing buildings; the principal use of the building where the intended use of the building is for more than one purpose.

On the building permit forms, the municipality reports; name and address of applicant (owner and agent); location of construction; intended use of the buildings — factory, school, church, etc.; class of work-

Les travaux de réparation qui sont destinés à rétablir un bâtiment dans son état initial (travaux de peinture, réfection de plancher, de toiture, etc.) ne sont pas compris dans la statistique des permis de bâtir. On peut toutefois obtenir une estimation de ces travaux en consultant *La construction au Canada* (n° 64-201 au catalogue de Statistique Canada) et *Perspectives des investissements privés et publics* (n° 61-205 au catalogue de Statistique Canada).

La classification des bâtiments non domiciliaires comporte trois groupes principaux fondés sur les destinations suivantes des immeubles: industrielle, commerciale et institutionnelle ou gouvernementale. Ces groupes se subdivisent à leur tour en catégories principales.

1. **Construction industrielle** — Comprend tout bâtiment destiné à la fabrication ou à la transformation de produits; au transport, aux communications et autres services d'utilité publique; à l'agriculture, à la sylviculture, à l'exploitation minière, y compris les installations de traitement des minéraux à la mine.
2. **Construction commerciale** — Comprend les magasins, entrepôts, garages, immeubles de bureaux, théâtres, hôtels, salons funéraires, salons de beauté, ainsi que des installations commerciales diverses — enseignes, affiches, chauffage, plomberie, etc.
3. **Construction institutionnelle et gouvernementale** — Comprend les dépenses faites par les collectivités, les corps publics et les gouvernements pour la construction d'immeubles ou bâtiments; par exemple, écoles, universités, hôpitaux, cliniques, églises, foyers pour vieillards, pour aveugles, pour sourds et muets; bureaux de gouvernement ou d'administration publique, services d'application de la loi, de protection du public, de défense nationale; enfin des bâtiments auxiliaires tels que dortoirs, résidences d'employés de service, presbytères, gymnases, chaufferies, buanderies et cafétérias d'hôpitaux, d'écoles ou d'universités.

FONDEMENT DE LA CLASSIFICATION

La classification des bâtiments en groupes et sous-groupes principaux se fondent sur les éléments ci-après: la destination prévue, dans le cas des immeubles nouveaux; l'utilisation réelle ou prévue des bâtiments auxquels des modifications ou améliorations sont effectuées; affiliation de l'immeuble où la construction envisagée a pour objet d'assurer des commodités accessoires; la principale utilisation de l'immeuble où la construction projetée est destinée à plus d'une fin.

Sur la formule de déclaration des permis de bâtir, la municipalité inscrit: les nom et adresse du requérant (propriétaire et agent); l'emplacement de la construction; la destination de l'immeuble — manufacture, école, église,

done — new, addition, etc.; the value of the proposed construction; and in the case of residential construction, number of dwelling units created.

The description given as to the intended use of the building, forms the basis for classification. If the structure is a new building or a conversion it is classified according to its intended use such as a factory, school, church, hospital, etc. Where the expenditure is of a repair nature, including all improvements to the property, alterations and additions, it may be classified as to the present use of the building, to which alterations are made or its intended use. If the construction work consists of installation of heating, plumbing or other such facilities, it will be classified as to the present use of the building. Where it includes an addition, such as a warehouse to a store, it will be classified to its intended use.

Where the construction work for institutional and government purposes provides additional facilities for existing buildings, these are classified according to the intended use of the existing structures. Examples are heating plants, cafeterias, nurses' residence for hospitals; dormitories, gymnasiums, libraries for universities; ancillary structures on prison farms, on Armed Force bases, etc.

A structure may have more than one intended use and therefore fall into more than one classification, and may be classified as to the principal use of the structure, or the value of proposed construction may be divided into more than one appropriate category. Where part of the structure is to provide additional facilities, whose value in relation to the principal use of the structure is relatively small, it will be classified as to its principal use. If the structure is a store and apartment, store and office building, restaurant and office building, etc., the value of the proposed construction may be divided among the appropriate classifications. However, where the principal use of the structure is a shopping centre but provides additional facilities such as banks, restaurants, etc., it will be classified as stores — the principal use of the structure.

etc.; la catégorie de travaux en cause — construction nouvelle, rajout, etc.; la valeur de la construction projetée et, dans le cas des constructions domiciliaires, le nombre d'unités de logement créé.

La description fournie relativement à l'utilisation éventuelle de l'immeuble constitue le fondement de la classification. S'il s'agit d'un nouveau bâtiment ou d'une transformation, l'ouvrage est classé selon sa destination — manufacture, école, église, hôpital, etc. Lorsque la dépense a pour objet des travaux de réparation, y compris toutes améliorations de propriété, modifications et rajouts, son classement peut s'effectuer en fonction de l'emploi que l'on fait déjà du bâtiment existant ou de la fin à laquelle on le destine. Si les travaux consistent en l'installation d'un système de chauffage, de plomberie ou d'autres commodités du genre, on les classe selon la fin à laquelle le bâtiment sert déjà. Lorsque les travaux comprennent un rajout, par exemple, l'addition d'un entrepôt à un magasin, le classement se fait d'après l'utilisation projetée.

Dans le cas où les travaux de construction effectués à des fins institutionnelles ou gouvernementales doivent assurer des commodités supplémentaires à des bâtiments existants, ces travaux sont classés d'après l'usage que l'on se propose de faire de l'immeuble existant. Voici des exemples pertinents: chaufferies, cafétérias, résidences d'infirmières pour hôpitaux; dortoirs, gymnases, bibliothèques d'universités; constructions auxiliaires dans des fermes-prisons ou dans des bases des forces armées, etc.

Étant donné qu'une même construction peut être destinée à des fins multiples, elle peut rentrer dans d'une classe; il est possible, en effet, de classer pareille construction d'après sa destination principale, ou de répartir la valeur des travaux entre diverses catégories appropriées. Si une partie de l'immeuble a pour objet d'assurer des commodités supplémentaires dont la valeur, par rapport à l'utilisation principale dudit immeuble, se révèle passablement faible, les travaux seront classés en fonction du principal usage de l'immeuble lui-même. S'il s'agit d'un bâtiment formé d'un magasin et d'un appartement, d'un magasin et de bureaux, d'un restaurant et de bureaux, etc., la valeur de la construction projetée peut être répartie entre les diverses catégories appropriées. Cependant, si une construction sert surtout de centre commercial tout en offrant des services supplémentaires (banques, restaurants, etc.), on la classe parmi les magasins, ce qui correspond en l'occurrence au principal emploi de la dite construction.

INTRODUCTION

Statistics Canada conducts a monthly survey of building permits issued in Canada. The material contained in this publication is compiled from data supplied by the issuing municipalities and therefore, varies from municipality to municipality with the terms of each individual by-law, with the methods of estimating the value of construction for permit issuing purposes and with the diligence with which the terms of the by-law are applied. Information is not available on the permits allowed to lapse without the work for which the permit was issued being completed.

This publication presents statistics on building permits issued during the month for each municipality reporting in the survey. Totals are available for provinces, for metropolitan areas, for economic regions, for counties and finally for the country as a whole. Municipalities are listed individually showing building permits issued according to the following classification:

1. Residential

- (a) Number of dwelling units created: single, seasonal, double, row, apartment dwellings, conversions of existing structures into new dwelling units, and total number of dwelling units.
- (b) Value of building permits issued for residential construction including residential garages, swimming pools, alterations and improvements.

2. Non-Residential

Value of building permits issued for new construction, alterations and improvements for industrial, commercial, institutional and government construction.

Area totals are the sum of the reporting municipalities and there is no allowance for municipalities not covered in the survey and for municipalities issuing permits but not reporting in the survey for the month in question. In some cases, reports from municipalities are received too late to be included in the relevant compilation; these municipalities are listed in the publication of the following month and a revised summary of building permits by county, by province and for Canada as a whole is made available in that month.

Statistique Canada effectue chaque mois un relevé des permis de bâtir émis au Canada. Les renseignements contenus dans la présente publication proviennent des données transmises par les municipalités qui émettent des permis; la statistique varie donc d'une municipalité à l'autre selon le règlement propre à chacune, selon les méthodes d'estimation des valeurs de construction appliquées aux fins d'émission des permis et selon la diligence avec laquelle les règlements eux-mêmes sont mis à exécution. On ne dispose d'aucun renseignement au sujet des permis pouvant déchoir sans que le travail prévu ait été exécuté.

La présente publication fournit la statistique des permis de bâtir émis au cours du mois par chaque municipalité participant à l'enquête. Des totaux figurent dans le cas des provinces, des zones métropolitaines, des régions économiques, des comtés et pour le Canada entier. Les municipalités sont énumérées individuellement, en regard des permis de bâtir répartis d'après la classification suivante:

1. Construction domiciliaire

- (a) Nombre de logements créés sous forme de maisons simples, de chalets, de maisons doubles, en rangée, d'appartements et de transformations de bâtiments en nouveaux logements, et nombre total d'unités de logement.
- (b) Valeur des permis de bâtir émis à l'égard de tous les travaux de construction domiciliaire, y compris les garages, les piscines, les modifications et les améliorations.

2. Construction non-domiciliaire

Valeur des permis de bâtir émis à l'égard des travaux de construction neuve, de modification et d'amélioration à des bâtiments destinés à des fins industrielles, commerciales et institutionnelles ou gouvernementales.

Les totaux régionaux représentent la somme des chiffres fournis par les municipalités faisant rapport; ils ne tiennent pas compte des municipalités non comprises dans l'enquête, ni des municipalités qui émettent des permis mais qui n'ont pas fait rapport pour le mois en cause. Dans certains cas, les rapports de la municipalité parviennent à Statistique Canada trop tard pour qu'on puisse les inclure dans le calcul pertinent; en pareil cas, les données paraissent dans la publication du mois suivant, et l'on publie, ce mois-là, un sommaire révisé des permis de bâtir, par comté, par province et pour le Canada entier.

DEFINITIONS

Residential

Includes only self-contained housing units and, therefore, excludes such structures as barracks and dormitories.

Number of units shown under Residential construction indicates the number of self-contained dwelling units added. For example, if an apartment building is constructed and contains six apartments, it will be shown as six dwelling units. When an existing structure is converted into additional housing units, the number of units added is included.

Single residential units are structures containing only one dwelling unit completely separated from any other dwelling or structure.

Cottages are seasonal dwellings such as summer homes and house-boats.

Double residential units are dwellings found in structures containing two dwelling units such as duplexes and semi-detached dwellings.

Row dwellings are one-family dwellings in a structure of three or more attached dwellings.

Apartments include all multiple housing with three or more units such as triplexes, quadruplexes, row duplexes as well as apartments proper. Flats, regardless of number, which are part of a non-residential structure are also included.

Conversions consist of dwelling units added by conversion of existing structures.

NATURE OF CLASSIFICATION

This classification is one of buildings or structures for which a building permit was issued by a municipality. A building permit may be issued by municipalities for: construction of new buildings; alterations, additions or conversions to existing buildings; installations of heating, plumbing and other facilities; erection of signs, posters, canopies, etc., and other improvements to property.

The classification for residential construction is intended to reflect the value of building permits issued for new dwellings: single, seasonal, double, row, apartments and conversions; for alterations and improvements to existing dwellings: additions, structural changes, residential garages and swimming pools, and other improvements to existing structures.

DÉFINITIONS

Construction domiciliaire

Ne comprend que les logements indépendants, à l'exclusion de bâtiments tels que casernes et dortoirs.

Nombre d'unités, qui paraît sous la rubrique Construction domiciliaire, correspond au nombre d'unités de logement indépendantes ajoutées. Par exemple, une nouvelle maison d'appartements de six logements comptera pour six unités de logement. Dans le cas de transformation de bâtiments en unités de logement additionnelles, on tient compte du nombre de nouvelles unités créées.

Logement simple s'entend des habitations à logement unique et indépendant de tout autre logement ou bâtiment.

Chalet s'entend de toute habitation saisonnière comme les maisons d'été et les maisons flottantes.

Logement double s'entend de toute maison d'habitation à deux logements comme les maisons jumelées et les duplex.

Logement en rangée s'entend de tout logement unifamilial compris dans un bâtiment formé d'au moins trois logements côte-à-côte.

Logement d'appartements s'entend de toute habitation comprise dans un bâtiment qui contient trois unités ou plus notamment les triplex, les quadruplex, les duplex en rangée et les appartements proprement dits. Quel que soit le nombre, les plain-pied qui font partie d'une construction non domiciliaire sont également comptés.

Transformation comprend le nombre de logements ajoutés par suite de la transformation d'un bâtiment déjà existant.

NATURE DE LA CLASSIFICATION

La classification utilisée dans la présente publication porte sur les immeubles ou bâtiments à l'égard desquels la municipalité a émis un permis de bâtir. Une municipalité peut émettre un permis de bâtir aux fins suivantes: construction de nouveaux bâtiments; travaux de modifications, rajouts ou transformations; installation d'appareils de chauffage, de plomberie et autres commodités du genre; érection d'enseignes, d'affiches, de marquises, etc., et autres améliorations d'immeubles.

La classification des bâtiments domiciliaires a pour but de montrer la valeur des permis émis pour des logements nouveaux: simple, saisonnier, double, en rangée, d'appartement et de transformation; la valeur des travaux de modification et d'amélioration à des logements existants: rajout, modification, garages, piscines et autres améliorations.

COVERAGE

The coverage of the Building Permits Survey can best be expressed in terms of the population of municipalities covered in the survey compared to the total population. Regular users of this publication will note that the table on page 11 reflects the coverage in terms of the 1976 Census population. For the purpose of approximating the coverage of the Building Permits Survey, the breakdown of the population into rural and urban areas is based on the rural-urban definition shown in the official 1976 Census. The urban population in 1976 consisted mainly of the population residing in cities, towns and villages, whether incorporated or not, and the "urbanized" or built-up residential fringes having a minimum population of 1,000 population and a density of at least 1,000 per square mile. The rest of the population was classified as rural.

In this publication, Metropolitan Areas are based on the 1976 Census definitions. They are defined as the main labour markets of a continuous builtup area having a population of 100,000 or more, corresponding to a commuting field or a zone where people could normally change their place of work without changing their place of residence. Although the 1976 Census defined Ottawa-Hull as a single metropolitan area, this publication treats this area as two distinct entities in their respective province.

Statistics Canada is currently endeavouring to extend the coverage of the survey in order to secure data from all municipalities issuing building permits. Thus, the coverage in terms of population may be expected to increase marginally, the population of the municipalities not reporting in the survey taken as a group being relatively small.

Although the results of the Building Permits Survey are often used as a leading indicator of building activity they may not be construed as representing the total construction activity in the country. Larger projects of a utilitarian character such as hydro-electric developments, filtration plants, pipelines, highways do not generally require building permits, and frequently large industrial plants are constructed outside the boundaries of a building permit issuing municipality.

COUVERTURE

La meilleure façon de mesurer la couverture de l'enquête sur les permis de bâtir consiste à comparer le chiffre de la population des municipalités visées au chiffre de la population totale. Les usagers de la présente publication remarqueront que le tableau de la page 11 donne un aperçu de la couverture de l'enquête en termes de la population du recensement 1976. Afin d'avoir une approximation de la couverture de l'enquête sur les permis de bâtir, la répartition rurale-urbaine de la population se fonde sur celle qui a été utilisée lors du recensement de 1976. La population urbaine en 1976 comprenait celle des cités, villes et villages de 1,000 habitants et plus, constitués ou non, et des zones "urbanisées" ou bâties à la périphérie, ayant une population minimum de 1,000 habitants et une densité d'au moins 1,000 habitants au mille carré. Le reste de la population était classée rurale.

Dans le présent rapport, les zones métropolitaines sont délimitées par les définitions du recensement de 1976. Elles sont définies comme le principal marché de travail d'une zone habitée continue ayant une population d'au moins 100,000 habitants, correspondant à une zone de déplacements quotidiens, soit celle dont les habitants pourraient normalement changer de lieu de travail sans changer de lieu de résidence. Bien que le recensement de 1976 définisse Ottawa-Hull comme une seule zone métropolitaine, la présente publication traite cette zone comme deux entités distinctes parce que situées dans des provinces différentes.

Statistique Canada essaie constamment d'étendre la couverture de l'enquête afin d'obtenir des données de toutes les municipalités émettant des permis de construire. On peut donc s'attendre que la couverture, exprimée en chiffre de population, s'accroisse, mais de peu seulement, vue que la population de l'ensemble des municipalités non soumises à l'enquête est relativement faible.

Même si les résultats de l'enquête sur les permis de bâtir sont souvent considérés comme un indicateur important de l'activité du bâtiment, on ne saurait estimer qu'ils représentent l'activité globale de la construction au pays. En effet, de vastes entreprises comme l'aménagement d'installations hydro-électriques, de pipelines et de routes ne requièrent pas de permis de bâtir et, bien souvent, de grandes usines se construisent en dehors des limites de toute municipalité émettant des permis de bâtir.

STRUCTURE USE CLASSIFICATION	CURRENT MONTH										% CHANGE in VALUE	CUMULATIVE YEAR-TO-DATE				Change Year
	CURRENT MONTH			SQUARE FEET (1000)	DOLLAR VALUE (1000)	SAME MONTH LAST YEAR		Number of Jobs		Square Feet (1000)		Last Year				
	Number of Jobs	SQUARE FEET (1000)	DOLLAR VALUE (1000)			DOLLAR VALUE (1000)		Current Year	Last Year	Current Year		Last Year				
						LAST YEAR	CURRENT YEAR									
APARTMENT BUILDINGS SINGLE/DOUBLE RESIDENCES	137	0	7257	0	1660	1306	27	604	541	16,909	8,871	68,383				
TOTAL RESIDENTIAL**	137	203	7257		1660	1322	1431	2596	2583	85,760	77,254	11				
HOTELS/MOTELS/RESTAURANTS	1	2	76	285		13	23	37	61	1,799	2,908					
OFFICE BUILDINGS	1	5	215	176		25	27	91	201	5,000	9,041					
MOTOR VEHICLE SERVICES	4	4	316	0		16	16	27	95	1,218	3,058					
WHOLESALE & RETAIL STORES	1	0	50	3946		33	29	1274	561	63,562	24,761					
PERSONAL SERVICES	0	0	0	0		2	5	0	26	1,400	1,521					
BUSINESS SERVICES	0	0	0	0		5	8	19	61	1,105	2,180					
RECREATIONAL FACILITIES	1	0	199	193		18	12	105	135	5,368	5,852					
WAREHOUSES & STORAGE BLDG	2	4	242	518		21	39	211	543	5,056	11,152					
TOTAL COMMERCIAL	10	15	1098	5118		133	159	1764	1683	84,328	60,473	40				
HOUSES OF WORSHIP	0	0	0	0		7	8	31	23	1,527	1,868					
HOSPITALS/MEDICAL SERVICE	1	0	82	3000		10	8	38	5	2,493	3,889					
WELFARE SERVICES	0	0	0	0		1	1	3	0	107	346					
PUBLIC BUILDINGS/OFFICES	0	0	0	0		6	4	54	6	2,445	673					
DEFENCE/LAW ENFORCEMENT BLDG	0	0	0	0		0	3	0	0	0	144					
EDUCATION BUILDINGS	2	9	537	0		13	4	57	106	3,537	3,612					
TOTAL INSTITUTIONAL	3	9	619	3000		37	28	183	140	10,109	10,532	4-				
MFG & PROCESSING PLANTS	0	0	0	1980		79	84	1542	1513	47,064	39,218					
TRANS/COMM UTILITY BLDGS	0	0	0	0		9	4	118	53	2,911	879					
MISC INDUSTRIAL BUILDINGS	0	0	0	0		9	7	86	49	1,344	621					
TOTAL INDUSTRIAL	0	0	0	1980		97	95	1746	1615	51,319	40,718	20				
TOTAL BUILDING CONSTRUCTION	150	227	8974	11758		1589	1713	6289	6021	231,716	188,977	23				
BRIDGES & OVERPASSES	0	0	0	0		1	1	0	0	40	150					
MARINE ENGINEERING CONSTR	1	0	36	0		4	2	0	0	1,742	766					
WATERWORKS/SEWERAGE CONSTR	2	0	3602	3043		34	36	0	0	14,856	14,808					
ROADS & AIRFIELDS	3	0	44	0		62	66	0	0	17,255	22,208					
DAMS	0	0	0	0		6	4	0	0	4,811	1,055					
ENGINEERED GAS/OIL FACILTS	0	0	0	0		1	0	0	0	75	0					
TUNNELS & SUBWAYS	0	0	0	0		2	1	0	0	388	250					
MISC ENGINEERING CONSTR'N	0	0	0	0		14	5	0	0	1,006	300					
TOTAL ENGINEERING CONSTRUCTION	6	0	3662	3043		124	115	0	0	40,173	39,545	2				
GRAND TOTAL	156	227	12656	14801		1713	1828	6209	6021	271,809	228,522	19				

NUMBER OF DWELLING UNITS IN
HAMILTON ON

Type of Building	Current Month	Same Month Last Year	Cumulative This Year	Cumulative Last Year	% Change
APARTMENT BUILDINGS	0	0	477	230	107
SINGLE/OCU RESIDENCES	136	37	1,341	1,471	109
TOTAL DWELLING UNITS	136	37	1,818	1,701	7

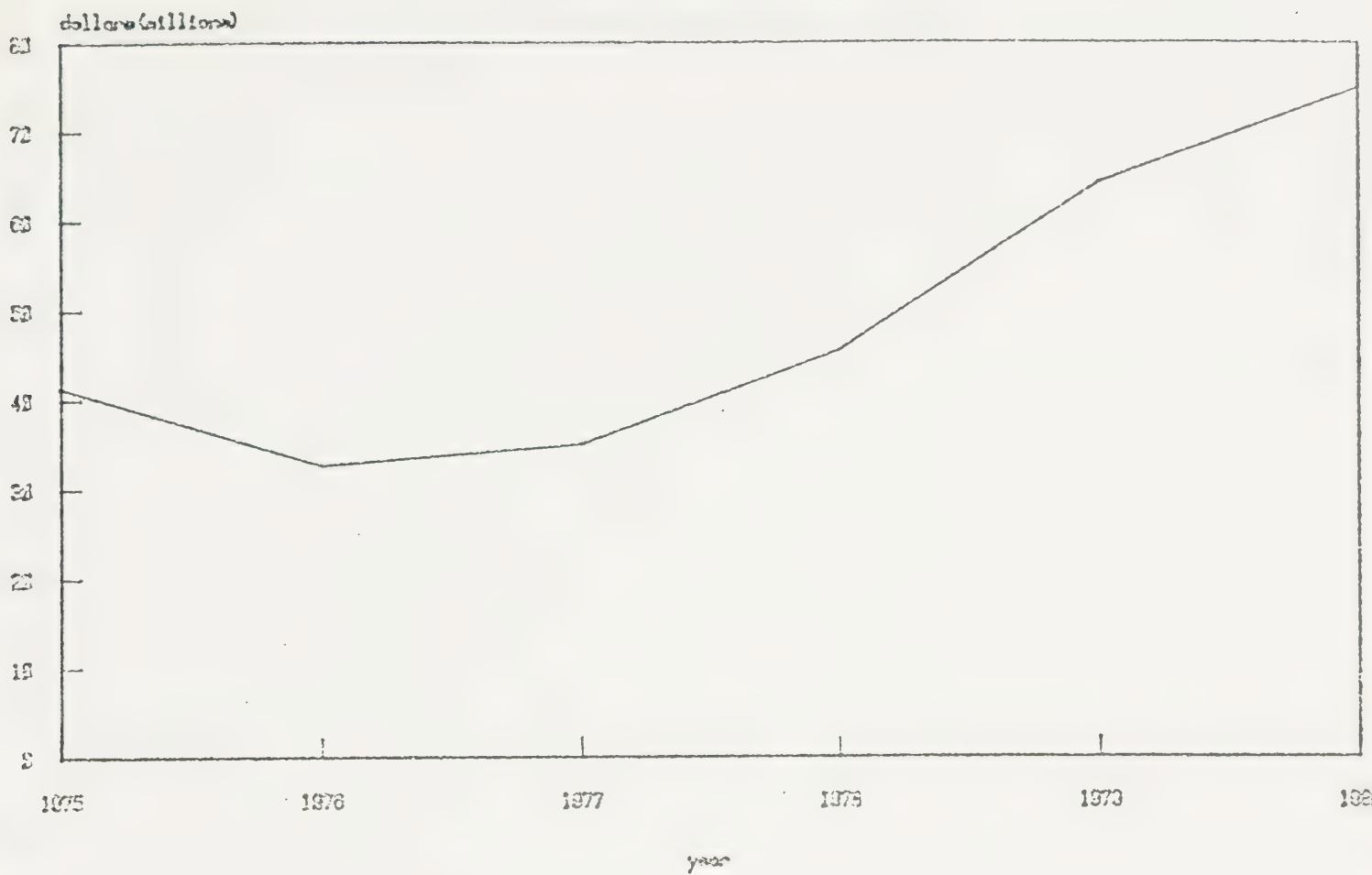
NOTES TO USERS

- NOTES TO USGERS**
1. Construction awards/starts are recorded up to ninety days before and after a project's preparation begins.
 2. Cumulative year-to-date figures may include revisions of data from previous months.
 3. Number of jobs is derived by counting each new structure, each addition, and each major alteration.
 4. Square feet are shown only for new construction and additions.
 5. Dollar value is shown for new construction and additions.
 6. Major alterations.

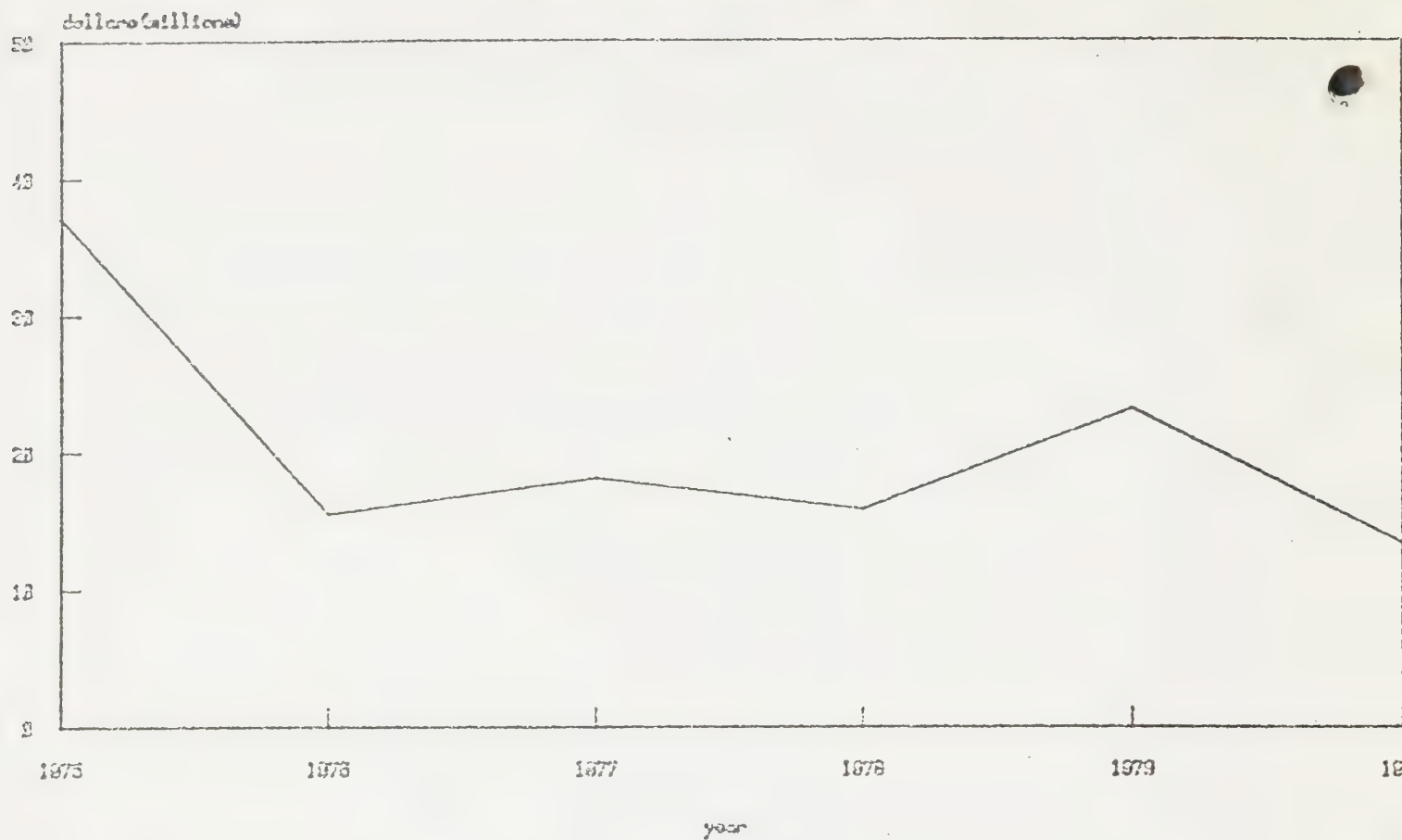
Copyright Southern Communications Limited. This report is confidential. Dissemination or reproduction of any information contained herein is granted only by contractor written permission of the Canada Data Division, 1450 Don Mills Road, Don Mills, Ontario M3B 2Y2.

VALUE OF COMMERCIAL BUILDING PERMITS

METROPOLITAN HAMILTON 1975-1980

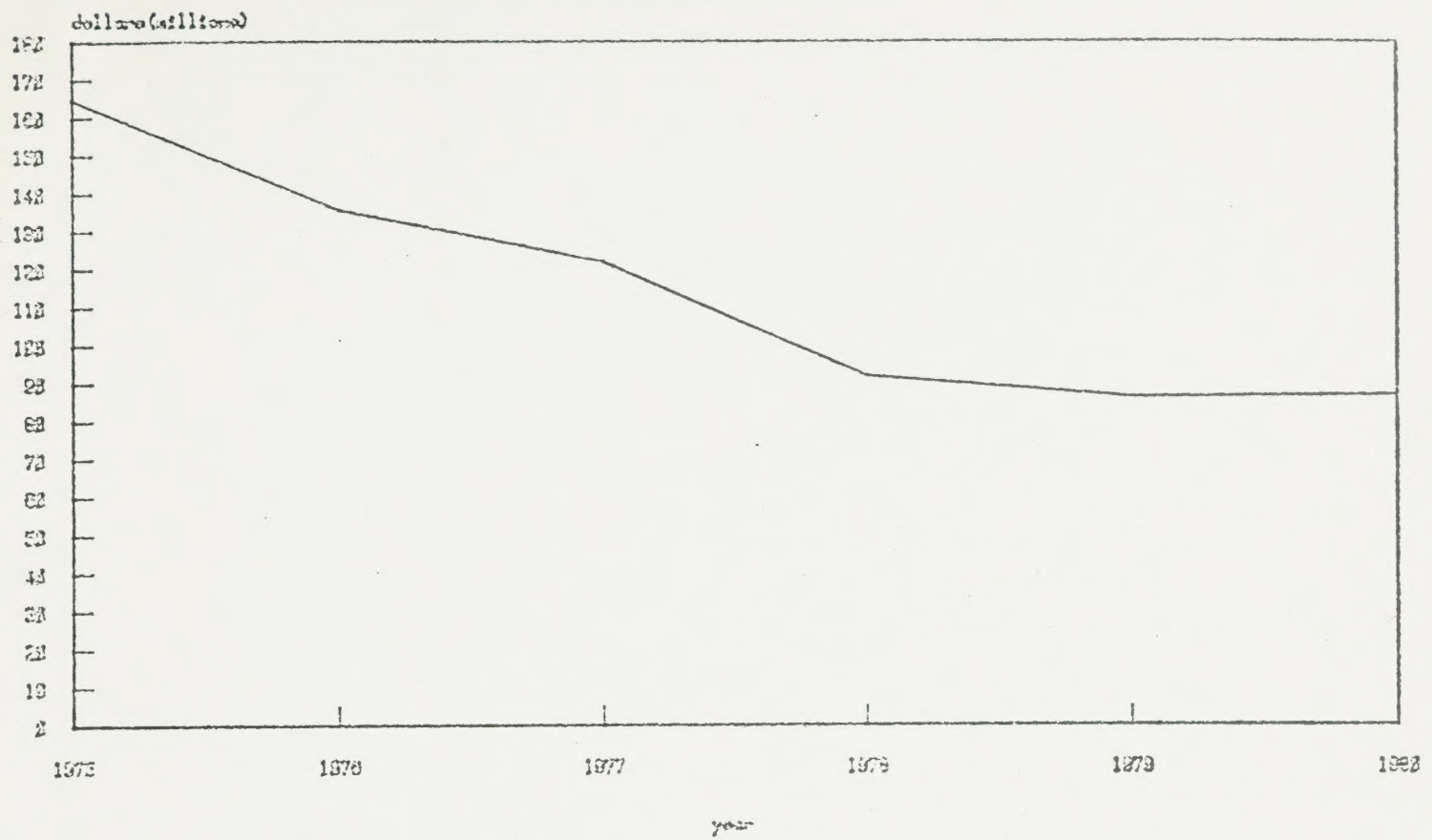


APPENDIX "D"-iv
VALUE OF INST. & GOVRNT. BUILDING PERMITS
METROPOLITAN HAMILTON 1975-1980

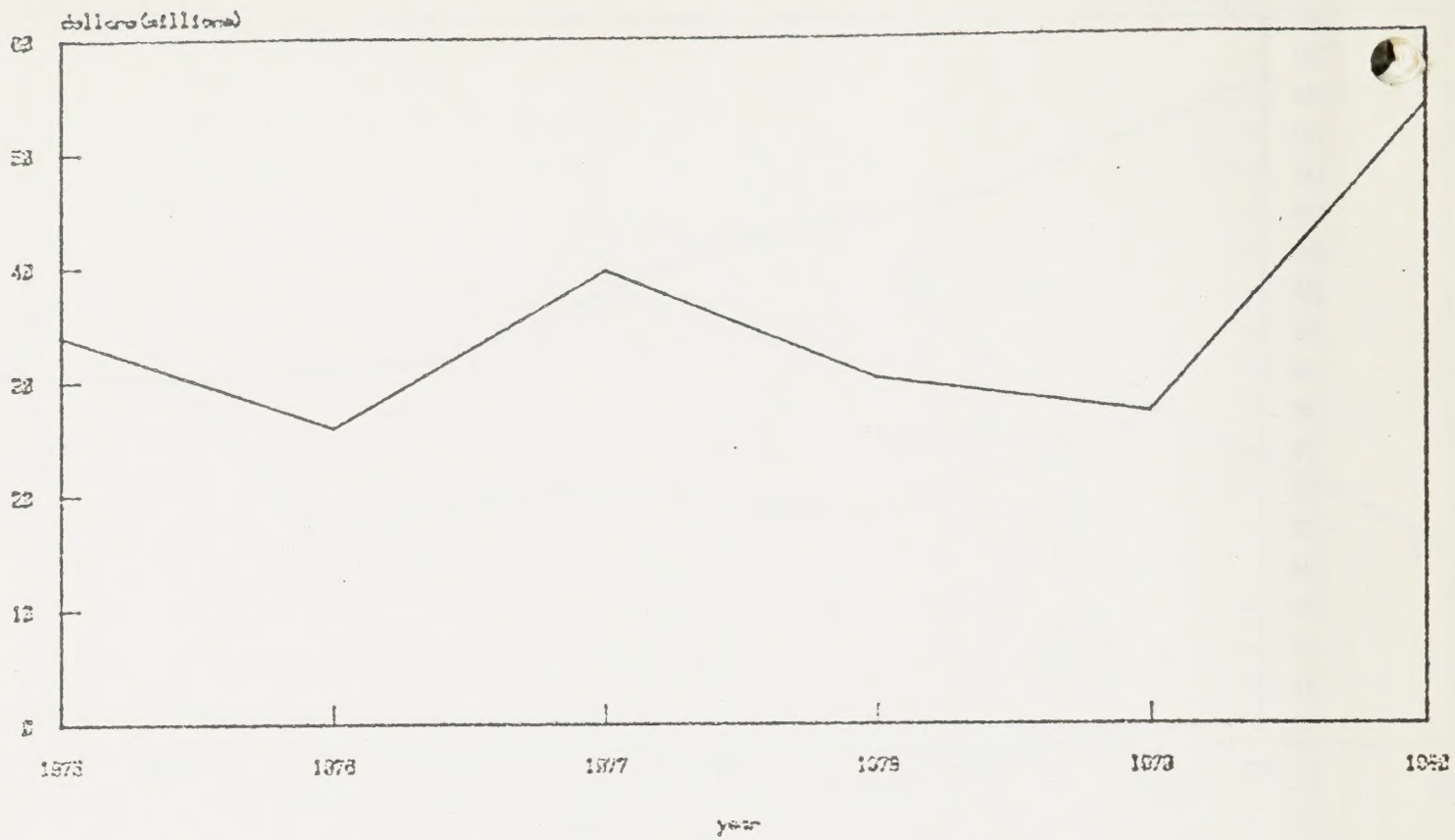


VALUE OF RESIDENTIAL BUILDING PERMITS

METROPOLITAN HAMILTON 1975-1983



APPENDIX "D"-ii
VALUE OF INDUSTRIAL BUILDING PERMITS
METROPOLITAN HAMILTON 1975-1982



MADE IN CANADA
1998
Pajoni

HAMILTON PUBLIC LIBRARY



3 2022 21333394 7

URBAN/

Sybil
1256
MADE IN CANADA